A Time of Change: Bitcoin

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The digital jingling of Bitcoin is growing louder as it gathers in the virtual pockets of investors and is exchanged between consumers and 50,000-plus corporations across the globe.[1] While still in its infancy with associated risk and unforeseen changes ahead, it is a movement gaining momentum with each transaction — from an eye-popping $147 million-dollar transfer down to a single digital-content purchase using a merchant's PayPal Payments Hub.[2] A movement the legal industry needs to be more aware of and prepare for.

This white paper will explore the emerging cryptocurrency, the pros, cons and — most important — recommendations for counsel looking to gain a place in the new digital space.

THE SUM OF ITS PARTS: BITCOIN DEFINED

In 2009, a person or group with the pseudonym Satoshi Nakamoto introduced Bitcoin to the world: an encrypted "peer-to-peer digital currency system," also known as "digital currency," "virtual currency" or "cryptocurrency."[3] Digital currencies, including Bitcoin, have aspects that verify the transfer of funds and operate independently of a central bank.

Like "real" money, Bitcoins are stored in a wallet — a digital wallet. Located within a computer or up in the cloud, it is a virtual bank account from which users can send, receive and save Bitcoins, though without the insurance of the FDIC.[4] A digital wallet is a free, open-source software program that generates Bitcoin addresses.[5]

When a new Bitcoin address is created, a cryptographic key pair consisting of a public key and private key is generated.[6] The public key can be likened to an account number and the private key, its ownership credentials.[7]

Bitcoin transaction history is recorded in the public log or ledger known as the "block chain." A transaction enters as part of a block in the "chain" of transactions with individual transaction authorizations being slightly delayed in order to pass verification checks performed by participants in the Bitcoin network.

The maintenance of the block chain is known as "mining." "Miners" verify each transaction and process the payments, adding it to the block chain. For their efforts, they receive Bitcoins in return. To claim these Bitcoins, a transaction known as a "coinbase" is included. "All Bitcoins in circulation can be traced back to such coinbase transactions."[8] When the arbitrary limit of 21 million Bitcoins is reached, miners will be compensated through transaction fees.[9]

The transaction information in the block is available for all and includes the amount transferred, the destination (another wallet address), the digital signature from the private key and the time of the transaction.

Sites like blockchain.info and other tools provide ways to search the ledger or perform higher-level analysis (like transaction volumes, prices and more). Thus, the block chain provides a level of transparency and security not necessarily present in current financial institutions and at a much lower cost per transaction.

STRENGTH IN NUMBERS

The list of companies large and small who are opening their doors to Bitcoin is expected to surpass 50,000 in September 2014.[10] Notable companies like Dell, DISH Network, Overstock.com, 1-800-Flowers.com and more are accepting the cryptocurrency, just as they would credit cards or PayPal, for goods.[11] Speaking of PayPal, the company recently announced it was partnering with Bitcoin processors BitPay, Coinbase and GoCoin in response to merchants' request for Bitcoin integrations. During this "test" phase, which entails, for example, creating a BitPay merchant account within the PayPal Payments Hub, payments will be permitted for digital goods only.[12] As Bitcoin's presence continues to strengthen, it's likely more merchants (and customers) will sign on. Will counsel? Let's examine the pros and cons.

PROS AND CONS

The virtual currency offers many benefits to investors, consumers and businesses.

Pros:

- **Lower Transaction Fees:** When users contribute to the network and share the burden of authorizing transactions, it reduces the transaction costs.[13] Lower fees mean the micro-transaction system could make viable, peer-to-peer transactions simpler and international transactions less challenging.[14]
- **Validation and Verification:** Bitcoin servers validate each transaction and the chain of ownership can be verified through a copy of the block chain stored in Bitcoin software.
- **Irreversible Transactions:** Since only the new owner of the Bitcoin has the associated private key, only he/she can change ownership of the coins.[15]
- **Anonymity:** A wallet address is private. "Even if the wallet address was publicized, a new wallet address can be easily generated."[16] While a wallet address provides anonymity, Bitcoin transactions can still be traced.
- **Security:** Unlike users of credit cards, Bitcoin users leave no personal data behind during a transaction that can be stolen and used.[17]

While the benefits of Bitcoin add shine to the cryptocurrency, there is also a flipside.

Cons:

- **Vulnerable to Loss:** If a hard drive crashes or malware hits the data and Bitcoins are lost, then they are lost for good. Nothing can be done to recover them.
- **Lack of Regulation:** While the ease of trading and transactions is attractive, there is also a lack of consumer protection, which results in governmental restrictions. "Lack of consumer protection is the number one reason that many countries do not allow the use or trading of Bitcoins."[18]
- **May Encourage Illegal or Illicit Activities:** Due to its anonymity, it may encourage tax evasion, weapons procurement, gambling and circumvention of currency controls.[19]
- **Too Volatile:** Because more speculators than consumers currently use the cryptocurrency, the price cannot be fixed. Some view this as too risky to invest in or accept payment for goods. [20]
- **The Unknown:** Bitcoin is still very new. So there are unknown regulation, fees and more on the horizon.

ADDRESSING THE RISKY BUSINESS

Corporations

Potential corporate risk associated with the cryptocurrency can be divided into two categories: supporting Bitcoin transactions with customers (external) and supporting Bitcoin within company finances (internal). Corporations eager to benefit from Bitcoin can reduce the risk by determining how to effectively and securely incorporate it into their business.

For the corporations that do decide to integrate Bitcoin into the company finances, processes in place that monitor and validate transactions are important. While the exact controls may be different, the need for monitoring is just like any financial transaction within a corporation — whether it be cash, accounts, etc. For Bitcoin transactions, since they cannot be cancelled, the protocols focus on multiple sign-off and validation. Recommended steps include:

- Implement a multi-signature transaction feature
- Set a maximum amount of allowable Bitcoin funds
- Require a multi-factor authentication on payments
- Delay payments to allow for verification

For those corporations that want to get in on the Bitcoin ground floor but who are more interested in having the cryptocurrency converted to dollars, there is the external payment provider. As mentioned earlier, one well-known provider is BitPay, a self-proclaimed pioneer in the bourgeoning industry. For example, they offer flat-rate pricing, guaranteed exchange rates, direct bank settlement and QuickBooks import. Using external payment service providers not only expands the options available to customers, but also meets demands without needing to change current internal account practices.

Consumers

While transaction information is publicly available and searchable on sites like block chain, info, a wallet address remains private. Currently, users can control their privacy level and may choose to publically post the Bitcoin wallet address associated with their name. Additionally, there are some exchanges that do require identifying information. Finally, in the name of consumer protection, some agencies are looking into regulating Bitcoin, which will be addressed shortly.

LEGAL IMPLICATIONS

Currency or Property?

One of the first legal matters to consider is whether Bitcoin is a currency or property. According to the Internal Revenue Service, it is a property, like stocks. This is a benefit to investors but the transactions would be subject to taxes. Generally, the rule would impose capital-gains taxes on investors' profits.[21]

Regulatory Issues

Nationally, there are regulatory issues but the appearance of BitLicenses in New York is a step toward regulating the virtual currency, thus providing more consumer protection and, perhaps, more confidence.

Now, those using the cryptocurrency will no longer remain anonymous. Businesses who buy, sell or process Bitcoin will be expected to keep track of customers' names and addresses and check them against the Specially Designated Nationals list maintained by the U.S. Treasury Department's Office of Foreign Asset Control.[22]

Bitcoin-friendly regulations are prepared to emerge from other states, too, including Texas, New Mexico, New Hampshire, Colorado and California.[23]

Internationally, there are numerous examples of Bitcoin and its regulation, including the Dutch campaign to see Bitcoin classified as money; Spain cracking down on Bitcoin gambling loopholes; and the Bank of England's position that Bitcoin could disrupt the United Kingdom's monetary policy.[24]

Money Laundering and Criminal Activity

As mentioned earlier, the anonymous nature of Bitcoin can attract those intent on illegal activities. Money laundering, drug purchases and more are possible through Bitcoin, notable cases of which will be introduced shortly. Legitimate use, however, is growing and regulations are on their way.

Case Framework

When a divorce is imminent, the hiding of marital assets is nothing new. According to some, the rise of Bitcoin offers another way for soon-to-be ex-spouses to "deceive and deprive a spouse of rightful marital assets."[25] Thus, courts are beginning to think about Bitcoin within case framework.

Craig Greene, a leading certified fraud examiner and founding partner of McGovern & Greene LLP, agrees.

> "As the cryptocurrency becomes more mainstream, more parties are utilizing it to hide assets leading up to and during divorce proceedings. Lawyers and courts need to be vigilant about this possibility and call upon forensic accounting specialists to dig in and find the Bitcoins when there is any suspicion."

For example, if counsel suspects assets have been hidden, then traditional financial forensics should be used to determine if a particular amount of money entered or exited the account. Then, counsel will have to undertake blockchain sleuthing to investigate similar amounts within specific timeframes. This, in turn, may lead counsel to the public Bitcoin address.

While it sounds in many ways like traditional financial tracking, some individuals will inevitably be more cunning about hiding assets — whether through real-world money laundering or splitting Bitcoin transactions across multiple addresses. So it would behoove lawyers to keep up with Bitcoin trends.

Also helpful to counsel will be the regulation of Bitcoin, which will force more identifiable information for basic and complex investigation. Furthermore, academic research papers, associations and conferences are working on several different methods for removing anonymity from the Bitcoin network.[26]

Bruce Potter, a noted security expert who founded The Shmoo Group and Ponte Technologies, was quoted on the matter in a 2013 The Security Ledger article: "I think (the research) is just the tip of the iceberg."[27] As long as others can't tie a public key with a real-world identity, he notes, Bitcoin's anonymity remains intact. But when the connection is made, there is a "cryptographically bound, (and) public record" of the relationship. Attempts to insert anonymity into the system will just create an arms race, he warned.[28]

> "The exchanges are an example. If you can use the exchanges to launder money off the blockchain, then you stand a chance of getting away free and clear. However, the exchanges are clearly where the governments will put their effort to gain access and regulate the audit trail (just like any other financial exchange)."[29]

According to the article and Potter, in order for Bitcoin exchanges to survive, they will need to become more transparent, like traditional currency exchanges.[30]

TALES FROM THE CRYPTOCURRENCY

Mt. Gox

When Mt. Gox — a Tokyo-based Bitcoin exchange — lost $400 million of customers' digital currency, it set off a virtual shockwave that continues to reverberate today.

There were allegations that it was an inside job by some company officials. Mt. Gox ended up filing for bankruptcy and was shut down. Since then, the criminal history of the chief executive, Mark Krapeles, has come to light while the substantial Bitcoin loss continues to cast a dark shadow on the cryptocurrency.

Forensic Accountant Greene also provides his professional opinion, here, too.

> "Theft that crosses international borders is harder to investigate, as cooperation of the country in which the cybercriminals are located is required. Extradition and asset recovery may be more complex for the same reason. Further, local laws may not address computer crimes. Since Bitcoin is a new monetary commodity, this may also complicate the investigation in gaining an understanding of the systems, accounting procedures, and the like."[31]

Silk Road

Launched in 2011, Silk Road was an online marketplace in which more than 900,000 registered users bought and sold illegal drugs using Bitcoin.[32] In 2012, federal authorities arrested a drug trader from the anonymous site, which led to the 2013 seizing of its servers and arrest of the alleged creator, Ross Ulbricht. Charges against him state that Silk Road accumulated sales of more than 9.5 million Bitcoin — approximately $3.7 billion today.[33] Also arrested, Charles Shrem — former BitInstant CEO and Bitcoin foundation member.[34] Recently, Shrem pleaded guilty to the charge, which could result in a prison term of up to five years when he is sentenced in early 2015.[35] Again, not the best press for Bitcoin.

SEC v. Shavers et al

According to a September 2014 decision, Trendon Shavers, owner of Bitcoin Savings and Trust, "knowingly and intentionally" operated a Ponzi scheme. He and his company were ordered to pay $40.7 million. The SEC determined that using the alias "pirateat40," Shavers misled investors and raised more than 732,000 Bitcoin, which were then used to repay other investors, placed in personal accounts in Mt. Gox, and also put toward rent, food and more.[36] Bitcoin gets bad press once again.

THE FUTURE OF LAW IN A BITCOIN WORLD

Beyond being involved in litigating high-profile cases, how should the legal industry approach Bitcoin? For one, it must adjust to it or be left behind. Stephanie Alexander, a partner in Tripp Scott, asserts:[37]

> “Law firms should consider cryptocurrencies as a potential additional source of revenue, and the additional publicity and business that being an early adopter of such a transformative technology will bring is also likely to be a boon to those lawyers who jump on the bandwagon early.”

Alexander highlights that a Bitcoin block chain can disrupt commercial and contract law and probate and property law soon as well.[38]

> “For example, a will can be written and registered on the blockchain with instructions to transfer Bitcoin upon the death of the testator where the blockchain is asked to search the social security death index at regular intervals for record of the person’s death and to make the appropriate transfer once that record is found. No lawyers needed for the transfer.”

As a sign of the legal times, some law firms are already accepting payment through Bitcoin. As Bitcoin grows, so, too, does the need for legal expertise around cryptocurrencies. Alexander continues with her advice for counsel.[39]

> “This means that lawyers must start educating themselves about Bitcoin and its evolutionary changes to law. It also means that lawyers should start thinking about how they can fit their services into such crypto contracts and transactions.”

CONCLUSION

While we may never know the true identity of Satoshi Nakamoto, we can assume that Bitcoin began as a revolutionary idea to remove currency from the regulations and strictures of traditional centralized financial institutions while still creating a valid and secure system. As with any new idea, either its growing pains were not anticipated or are ones that typically arise with wide popularity and availability.

Despite this, Bitcoin is on its way to revolutionizing the business world and the global economy with its fluidity and cost-effectiveness. The evolution of Bitcoin must continue, though perhaps through altering some of its fundamental tenets, in order to reduce misuse and protect users. The Bitcoin evolution must also continue because as it gains increasing levels of popularity and acceptance, cryptocurrency usage will be a question corporations face from a business strategy, security, compliance, risk and legal perspective.

While the arrival of Bitcoin signals change, it’s part of the bigger data and discovery change that counsel has already encountered. Adjusting to Bitcoin can help ensure that counsel continues to stay nimble and knowledgeable in the Digital Age.

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